

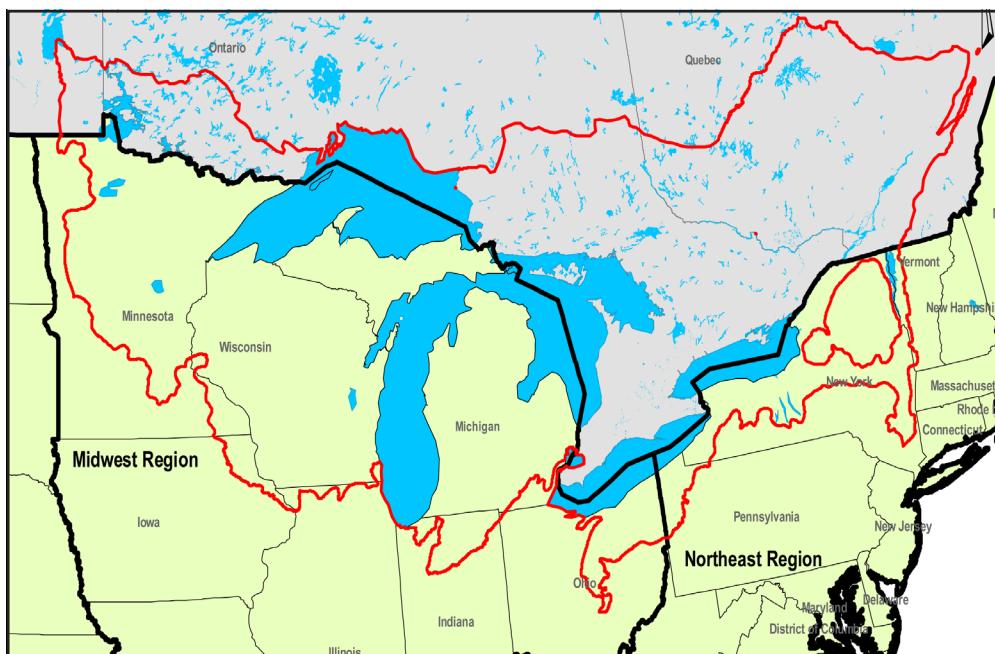
Upper Midwest and Great Lakes Landscape Conservation Cooperative



The U.S. Fish & Wildlife Service (Service) believes that success in conserving our nation's natural resources depends on the ability of private, state and federal agencies to collaboratively develop and implement a common vision of landscape sustainability. This means, in part, working together to develop regional and continental strategies to design and target site-scale efforts for fish, wildlife, and plant species.

To help achieve this vision, the U.S. Fish and Wildlife Service is working with partners to establish a national network of Landscape Conservation Cooperatives (LCC's) that will provide the principal scientific and technical support to identify biological outcomes for the purpose of efficient conservation delivery.

Landscape Conservation Cooperatives will provide scientific and technical support for conservation at "landscape" scales—the entire range of an identified priority species or groups of species. They will support biological planning, conservation design, prioritizing and coordinating research, and designing species inventory and monitoring programs. LCCs will also have a role in helping partners identify common goals and priorities to target the right science in the right places for efficient and effective conservation. By functioning as a network of interdependent units rather than independent entities, LCC partnerships can accomplish a conservation mission no single agency or organization can accomplish. LCCs are meant to be cooperative, partnership-oriented entities focused on developing, adapting and coordinating large-scale data and models for field-level use.



Proposed Map of the Upper Midwest and Great Lakes Landscape Conservation Cooperative

The Upper Midwest and Great Lakes Landscape Conservation Cooperative

As part of this national network, the Service and partners are establishing the Upper Midwest and Great Lakes Landscape Conservation Cooperative (UMGL LCC). The geographic area transcends existing U.S. Fish and Wildlife Service regional boundaries and the international border with Canada. The LCC includes portions of Minnesota, Iowa, Wisconsin, Illinois, Indiana, Michigan, Ohio, Pennsylvania, New York and Vermont, as well as areas of Manitoba, Ontario and Quebec.

The UMGL LCC area includes unparalleled deepwater habitats, beaches, coastal wetlands, more than 35,000 islands, major river systems, boreal forests, and prairie-hardwood transition zones. These habitats provide for extensive resident and non-resident game populations, fish and many other aquatic resources, waterfowl, colonial waterbirds, marshbirds, and neotropical migrant landbirds.

North America's Great Lakes are the largest system of fresh, surface water on Earth, stretching 1,160 miles from the western end of Lake Superior to the outlet of Lake Ontario and contain 5,472 cubic miles of freshwater. The Lakes contain roughly 20 percent of the world's, and more than 80 percent of North America's, freshwater supply. The Lakes' coastline is equal to approximately 10,500 miles, or nearly 44 percent of the earth's circumference.

The unique deepwater habitats of the Great Lakes support extensive fish communities including many important sport and commercial species. The Great Lakes Fishery Commission has estimated the value of Great Lakes fisheries at \$7 billion annually. These are among the world's largest and most valuable freshwater fisheries.

The Great Lakes are large enough to define regional weather patterns, strengthening storms and causing "lake effect" conditions. The Great Lakes connect to the Atlantic Ocean through

the Saint Lawrence Seaway, and to the Gulf of Mexico through the Illinois and Mississippi Rivers, accommodating major commercial shipping operations and some of the largest oceangoing vessels. Approximately 40 million people live near the Great Lakes, with 28 major populations centers spread across the basin.

The Upper Midwest and Great Lakes have experienced major ecological changes during the past 150 years due to many stressors. New environmental challenges continue to arise even as we address these historical damages. The impacts of climate change are already evident in warmer water, longer ice-free season, earlier spring runoff, changing water levels and resulting habitat alterations and impacts to water quality and ecological processes.

Great Lakes management agencies continue to develop and implement innovative programs toward remediation of contaminated sites, habitat restoration, dam removal for fish passage, control of invasive species, improved fisheries management, alleviation of nonpoint source pollution, conservation of native species and communities and the many other stressors the area faces.

There has been significant progress in restoring the Great Lakes, however due to their size and complexity, significant gaps remain in our knowledge of factors and processes impacting the area. There is a great need for more strategic, science-based information to guide and evaluate decision-making.

Partnerships

The Service has a long and successful history of collaborating with our partners in the Upper Midwest and Great Lakes.

The Service will work to involve a diverse array of partners in this LCC, including the fish and wildlife agencies of all included states, as well as Native American tribes and Canadian federal and provincial agencies and many nongovernmental and interjurisdictional organizations.



Capacities

Existing Service science and strategic habitat conservation planning capacity includes national wildlife refuges, fish and wildlife conservation offices, ecological services field offices, national fish hatcheries, fish technology and fish health centers, sea lamprey biological stations, and Joint Venture program offices spread across two Service regions.

Other federal, state, tribal, public and private partners have significant science capacity that may provide capacity for this LCC.

Depending on the LCC's priorities, objectives, and operational needs, we will consider — establishing additional staff positions with expertise in, but not necessarily limited to, the following disciplines:

- Data management and analysis
- Ecology
- Communications
- Social science
- Monitoring coordination
- Decision analysis
- Conservation Genetics

Timeline (*estimated*)

December 2009:

Establish LCC advisory team.

January 2010:

Conduct scoping sessions.

February - March 2010:

Analyze scoping data.

April - September 2010:

Formalize partnerships, fill permanent LCC coordinator and other key positions. Identify and science needs and begin funding research.

Cost (*estimates*)

Depending on the existing capacity and needs of the LCC, a fully functioning LCC may include 15-20 FTEs within the Service or partner organizations. Because of the geographic size of this LCC, it may be necessary to establish more than one office. We estimate a fully functional LCC office will require an annual operating budget of \$5 - \$7 million.

Contact

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